

AMENDMENTS TO THE CLAIMS

Please amend claims 47 and 69 as follows. A detailed listing of all claims in the application is presented below. This listing of claims replaces all prior versions and listings of the claims in the application. All claims currently amended are submitted with markings to indicate the changes relative to the immediate prior version of the claims. The changes in any amended claim are shown by strikethrough or double bracketing (for deleted matter) or underlining (for added matter).

Listing of Claims:

1 – 46 (canceled).

47 (currently amended). An isolated recombinant DNA comprising a DNA selected from the group consisting of

- a) a recombinant DNA that encodes a protein having an amino acid sequence as shown in SEQ. ID. NO. 3 wherein the protein elicits an immune response against *E. canis*;
- b) a recombinant DNA that encodes a protein having an amino acid sequence as shown in SEQ. ID. NO. 5 wherein the protein elicits an immune response against *E. canis*;
- c) a recombinant DNA that encodes a protein having an amino acid sequence as shown in SEQ.ID. NO. 7 wherein the protein elicits an immune response against *E. canis*;
- d) a recombinant DNA that encodes a protein having an amino acid sequence as shown in SEQ. ID. NO. 9 wherein the protein elicits an immune response against *E. canis*; and
- e) a recombinant DNA that encodes a protein having an amino acid sequence as shown in SEQ. ID. NO. 11 wherein the protein elicits an immune response against *E. canis*.

48-68 (canceled).

69 (currently amended). A vector capable of expressing [[a]] an isolated recombinant DNA comprising the isolated recombinant DNA inserted into the vector such that a recombinant

protein is expressed when the vector is provided in an appropriate host wherein the isolated recombinant DNA is selected from the group consisting of:

- a) SEQ. ID. NO. 2, wherein SEQ. ID. NO. 2 encodes a protein having an amino acid sequence as shown in SEQ. ID. NO. 3 and wherein the protein elicits an immune response against *E. canis*;
- b) SEQ. ID. NO. 4, wherein SEQ. ID. NO. 4 encodes a protein having an amino acid sequence as shown in SEQ. ID. NO. 5 and wherein the protein elicits an immune response against *E. canis*;
- c) SEQ. ID. NO. 6, wherein SEQ. ID. NO. 6 encodes a protein having an amino acid sequence as shown in SEQ. ID. NO. 7 and wherein the protein elicits an immune response against *E. canis*;
- d) SEQ. ID. NO. 8, wherein SEQ. ID. NO. 8 encodes a protein having an amino acid sequence as shown in SEQ. ID. NO. 9 and wherein the protein elicits an immune response against *E. canis*; and
- e) SEQ. ID. NO. 10 wherein SEQ. ID. NO. 10 encodes a protein having an amino acid sequence as shown in SEQ. ID. NO. 11 and wherein the protein elicits an immune response against *E. canis*.